



#27 M  
ANDY D  
9.12.03

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re application of

Attn: BOX RCE

Mitsuaki OSHIMA et al.

Docket No. 2000\_1328

Serial No. 09/672,946

Group Art Unit 2634

Filed September 29, 2000

Examiner A. Le

COMMUNICATION SYSTEM

Confirmation No. 7022

RECEIVED

AUG 29 2003

Technology Center 2600

AMENDMENT

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

THE COMMISSIONER IS AUTHORIZED  
TO CHARGE ANY DEFICIENCY IN THE  
FEES FOR THIS PAPER TO DEPOSIT  
ACCOUNT NO. 23-0975

Sir:

In response to the Office Action mailed May 27, 2003, please amend the application as follows.

IN THE SPECIFICATION:

Please replace the specification and abstract with the attached substitute specification and abstract.

IN THE CLAIMS:

Please cancel claims 19-30 and add new claims 31-39 as follows.

31. A signal transmission and receiving apparatus comprising a transmission apparatus and a receiving apparatus.

said transmission apparatus comprising:

- a mapper operable to map a first data stream to a 2-level mapped signal having two levels separated by a first amount, and to map a second data stream to an 8-level mapped signal having eight

D1  
cont